

# Eureka!

The Journal of Mining Collectibles

Issue 46



January 2013

A. L. HANSEN.  
MINER'S ACETYLENE LAMP.  
APPLICATION FILED JULY 26, 1915.

1,202,514.

Patented Oct. 24, 1916.

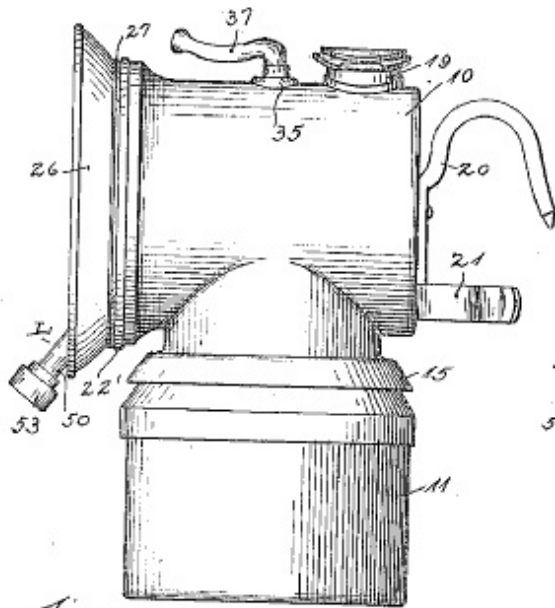


Fig. 1.

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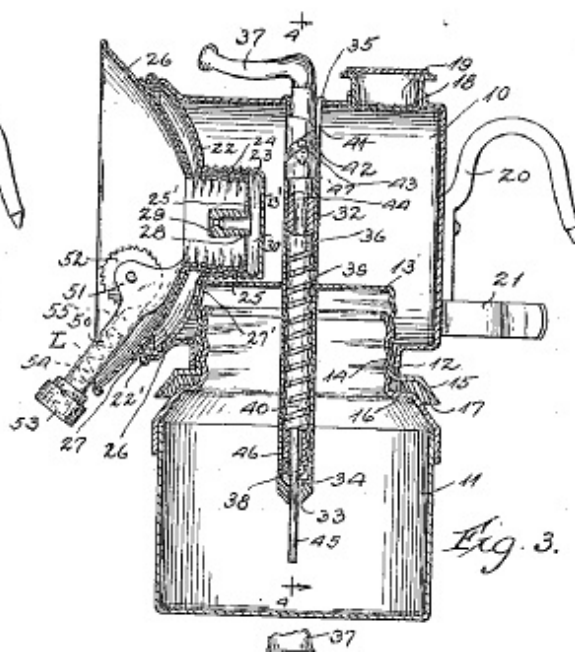


Fig. 3.

# *Eureka!* The Journal of Mining Collectibles

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Cover: Hansen patent for screw socket cap lamp. A similarly appointed lamp has recently been found (pages 32–33)

# Square Font Oil Wick Lamp

*by Dave Johnson*

Recently, while looking at an old photo owned by Deric English, I spied a miner with an unusual square font oil-wick lamp. This is the first time I have seen one of these pictured in use. I have an example of such a lamp that is very similar.

The lamp has a copper font and spout, steel hook and brass threaded lid. It stands 3" tall to the top of the lid and 5 ¼" to the top of the spout. It has an unusually long single wall spout, longer than the one in the photo.

This square font design, while not patented to my knowledge, would have the advantage of keeping the lamp from flopping from side to side as cylindrical oil-wick lamps with wire hooks are prone to do.

I have enjoyed examining old photographs in detail. This blowup of a portion of one shows that you never know what you will find. I appreciate Deric allowing me the use of his photo for this article. It was pleasant assurance to know that this style of lamp was used in mining.



# Perforated Miners' Candle Sticks

*by Dave Johnson*

Collectors are drawn to items with unusual aspects that make them stand out from others. The following eight miners' candlesticks differ from the standard pattern by having holes, or perforations, in their handles, thumb levers and thimbles. The perforations are purely decorative and take the form of round holes or slots.

They are fairly uncommon — in Wilson & Bobrink's book, *A Collector's Guide to Antique Miners' Candlesticks*, only 10 examples of sticks with perforations are illustrated among the multitude of candlesticks shown.

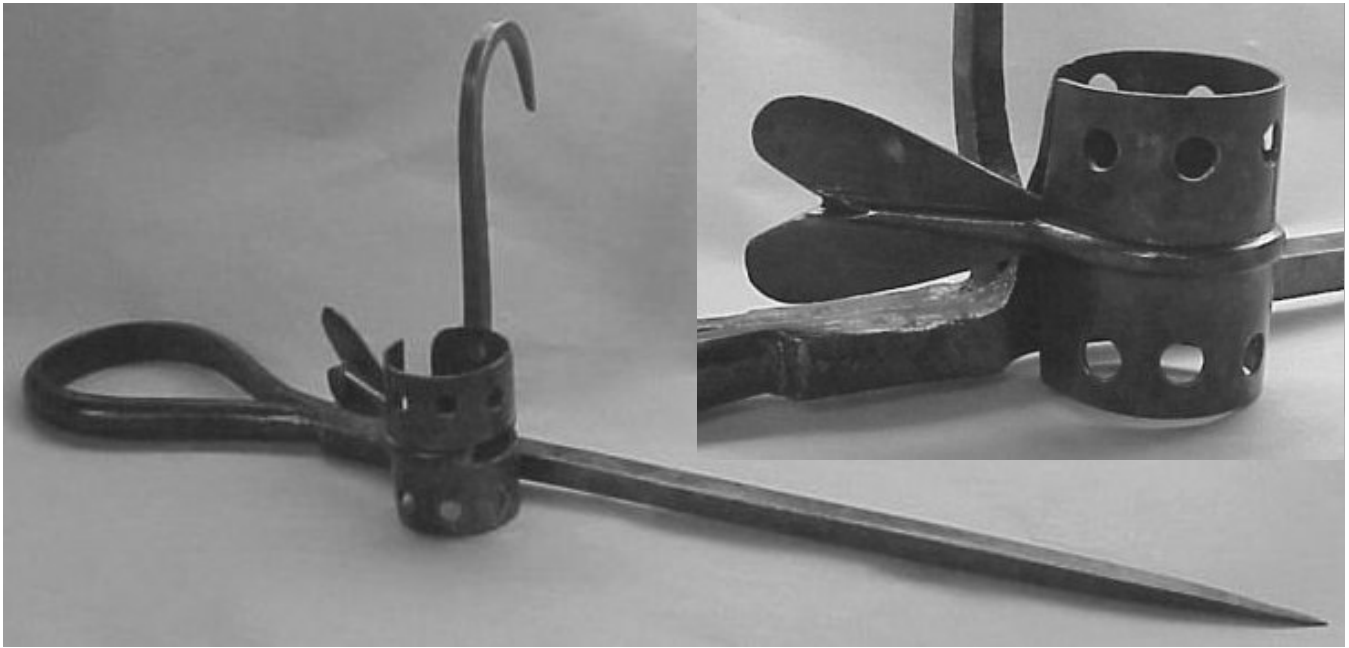
On each of sticks shown here, the perforations are not the only decorative work found. Each has other file work on the spike, thimble, thumb lever or handle. The easiest of these decorative perforations to make would be the round hole. The long slots would be more difficult and the most difficult would be the angled slots found on one of the thimbles. The other file work is of varying degrees of difficulty.



Stick 1

Stick 1 features 4 round holes in the thumb lever and thimble as well as 2 slots that go most of the way around the thimble. The thumb lever is octagonal with a hole in the center. The spike goes from square at the point to octagonal, then back to square with tapered edges. There is a brass inlay where the handle





Stick 2

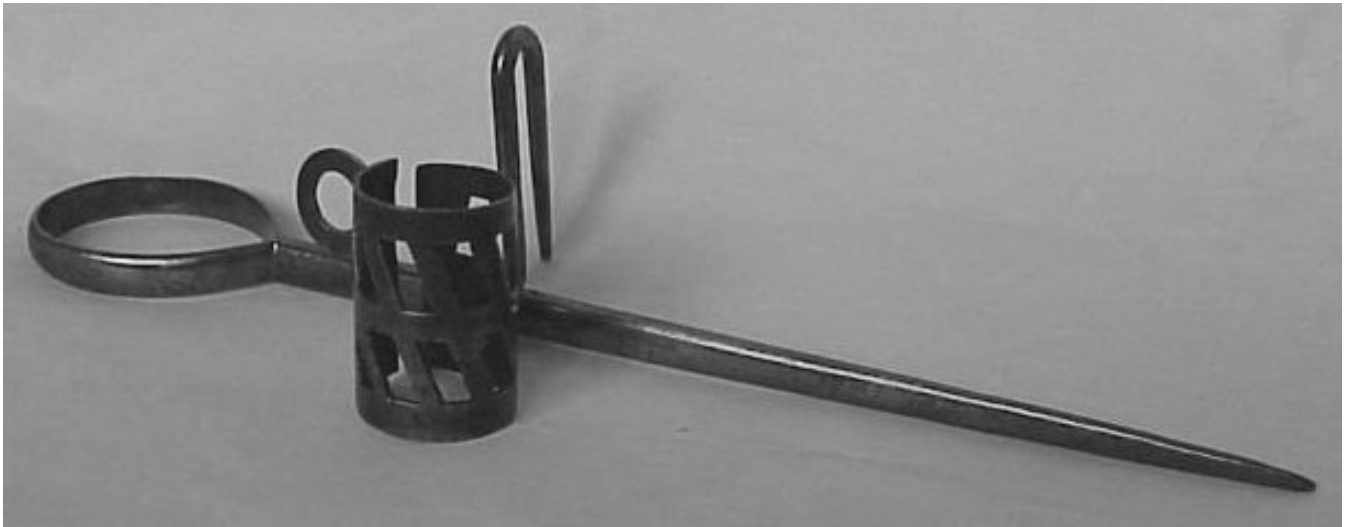
Stick 2 has a thimble with 12 holes, 6 on the top half and 6 on the bottom half. There is a short square slot in the center of the thimble toward the spike. The thumb lever is heart-shaped with a center-ridge that extends across it and part way around the thimble.



Stick 3

Stick 3 has a wide handle with 5 holes evenly spaced around it. The thimble has 4 holes going around its circumference. There is filing at the top of the thimble.





Stick 4

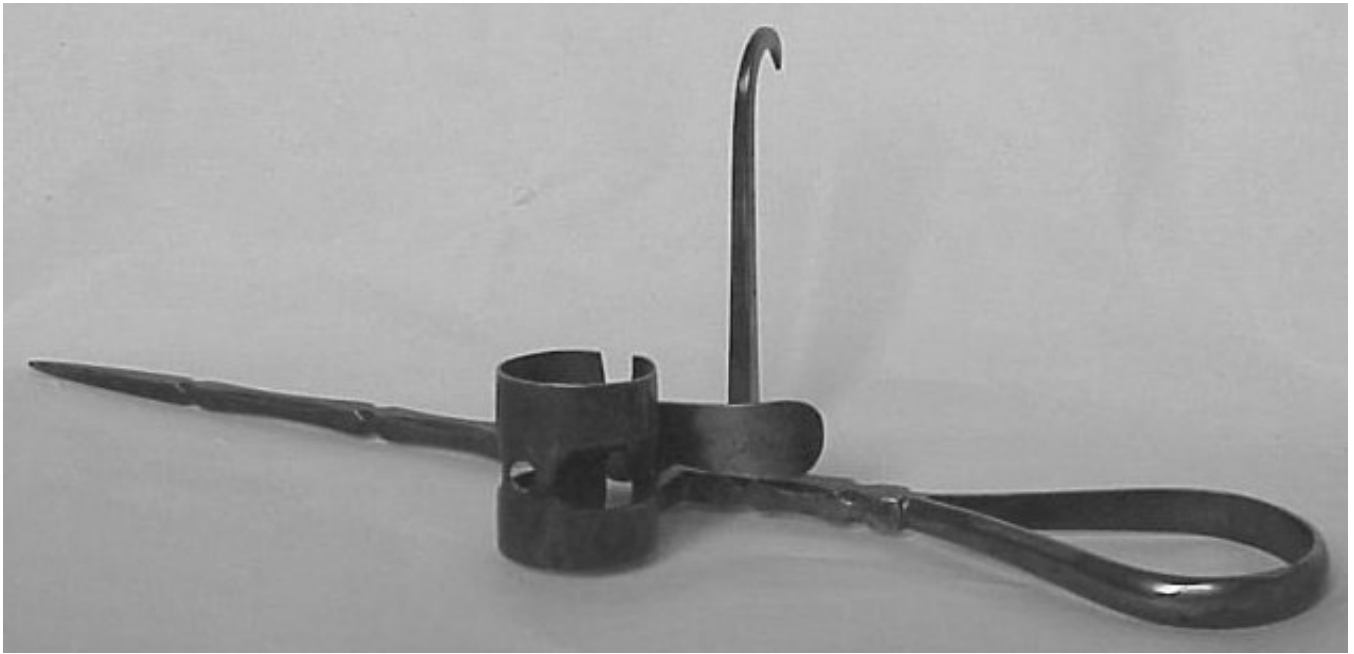
Stick 4, with its Lake Superior style hook, has a most unusual holed and slotted thumb lever, along with a very unusual thimble featuring angled slots.



Stick 5

Stick 5 has a large oval hole in the thumb lever and lots of fancy filing in the spike toward the point and toward the handle.

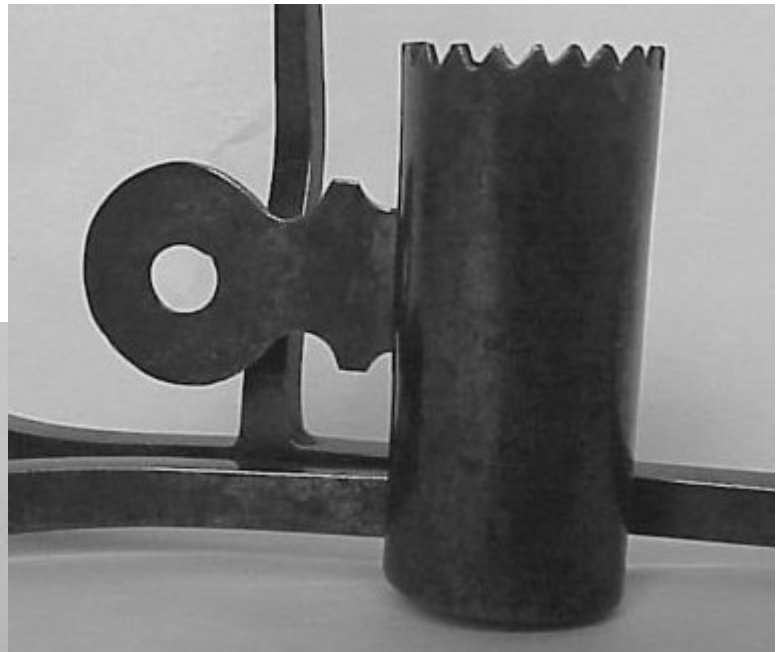




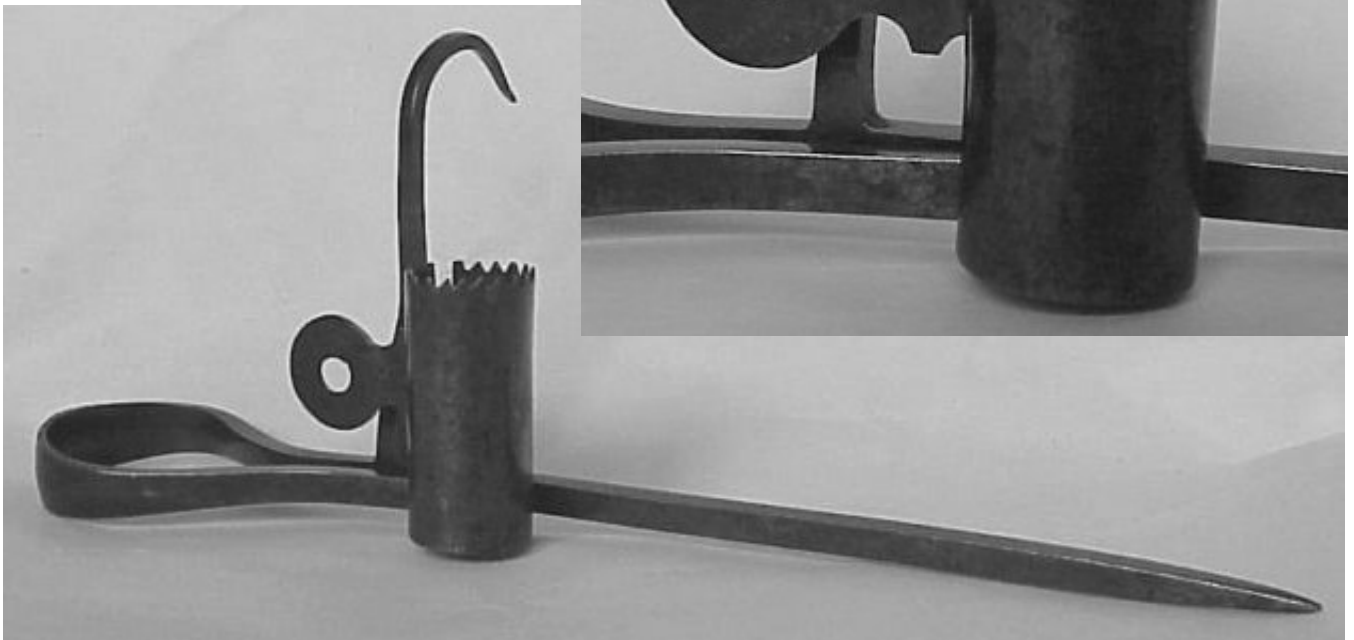
Stick 6

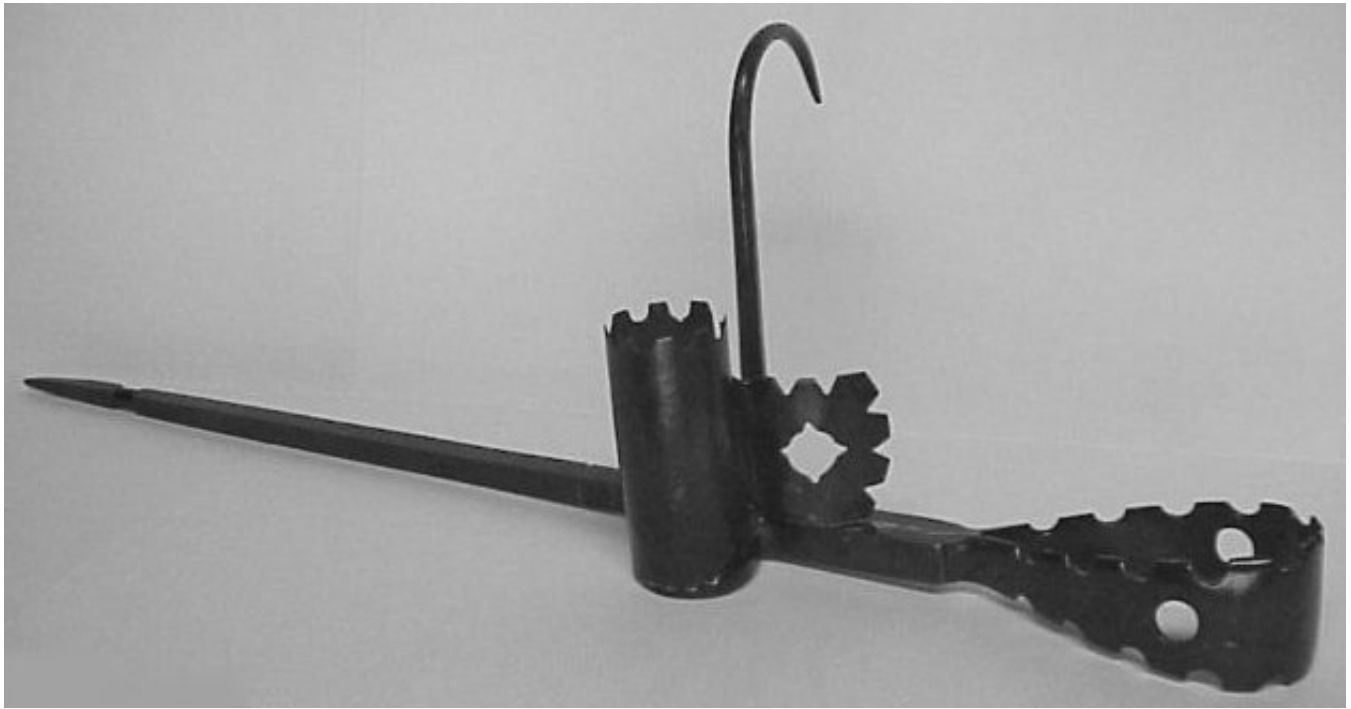
Stick 6 has a thimble with a single round hole with two elongated slots with round ends on each side. The spike has fancy filing along its entire length.

Stick 7 has a fancy thumb lever with a hole in the center. The thimble is exceptionally tall with filing around the top edge.



Stick 7





Stick 8

Stick 8 features a tall thimble with file work around the top edge. The handle has two opposing holes and file work around the top and bottom edges. The thumb lever has a round hole in the center with 4 points coming out of it, and there is filing around the top and side edge of the thumb lever. The spike has filing in two places along its length. This stick sat on a mantle for more than 30 years before I acquired it.

Of the eight sticks pictured, only one has a Lake Superior style hook, the rest have western style hooks. It is the Lake Superior stick that has the perforations that were the most difficult to produce.

Each of these sticks was a working stick with indications of actual use. Many fancy sticks were never meant to be used, and were either presentation pieces or designs meant to show the skill of the craftsmen who made them. These perforated sticks are, at one time, both fancy and utilitarian.



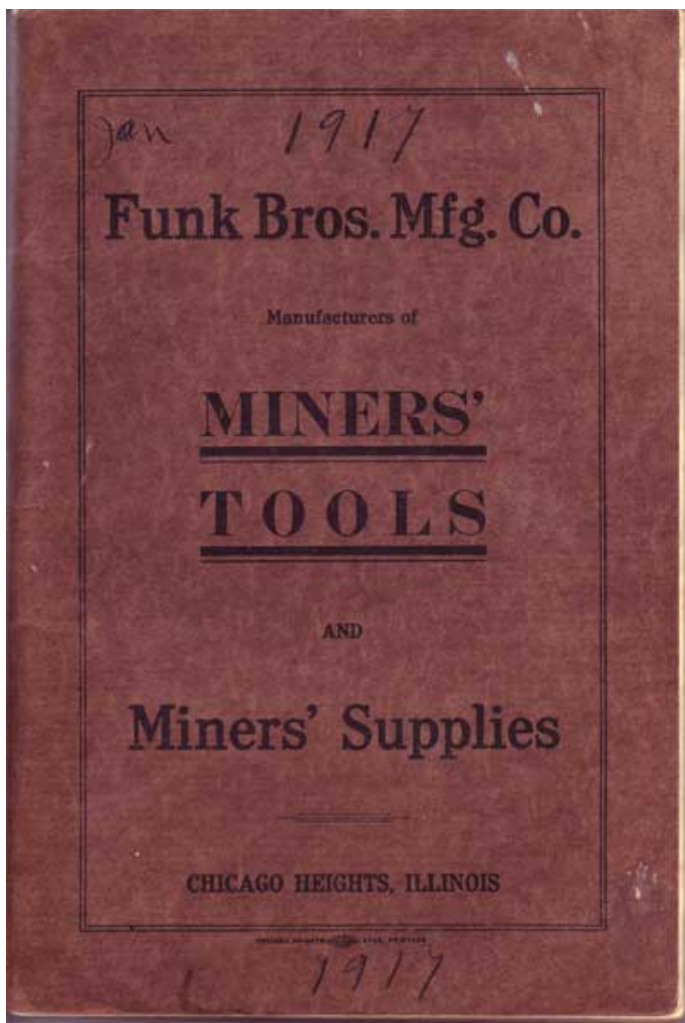


# Catalogs and Carbides

by Dave Thorpe

Shown here are catalogs from two mine supply companies: Funk Bros. Mfg. Co. of Chicago Heights, Illinois and American Mining Tool Co. of Ottumwa, Iowa. Each catalog displays both oil wick lamps and early acetylene lamps. The illustrations show carbide lamps that date to the 1910–13 era.

Funk Bros. were known to have sold a carbide cap with their own name stamp lamp resembling the Baldwin hourglass style. That lamp, probably made by Grier Bros. would pre-date the Justrite lamps shown in this Funk Bros. catalog.



62 FUNK BROS. MANUFACTURING CO.

## Justrite Carbide Lamps



No. 80 Lever Feed



No. 85 Lever Feed



Superintendents' Lamp

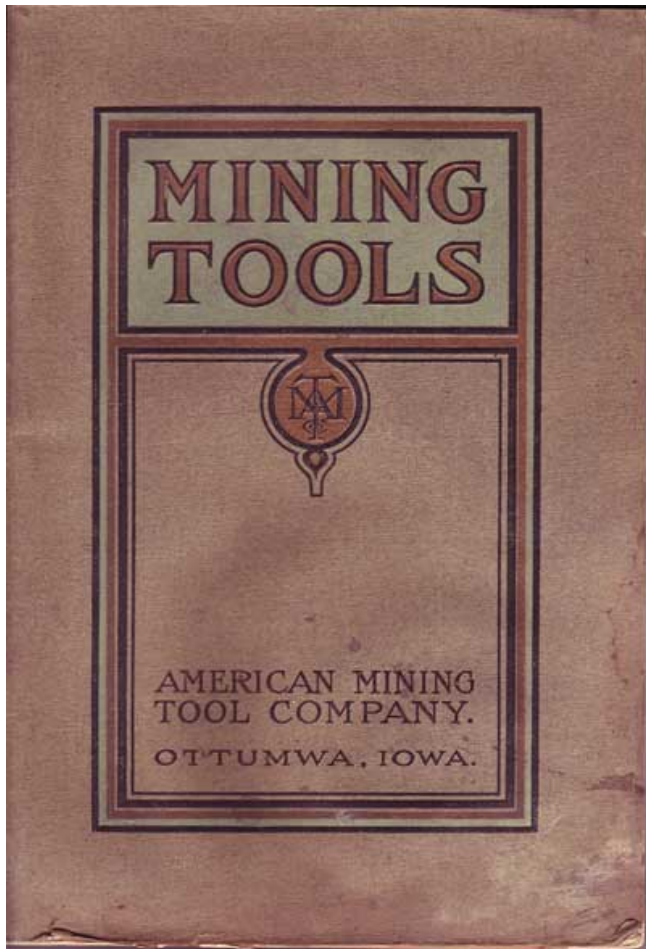


Repair Outfit  
No. 1 and No. 2

### List of Repairs

No.	No.
15—Reflector Hoods	63—Cleaning Wires
25—3-inch Reflector.	64—Felt Holder
60—Rubber Gaskets	65—Valve Stem
61—Lantern Gaskets	66—Burner Tips
62—Felt Packing	68—Extra Bottoms

*Funk Bros. Mfg. Co. catalog is penciled with a 1917 date. Pricing insert pages are also officially printed with this date, although the lamp illustrations appear to be earlier, ca. 1913.*



**Miner's Cap Lamp**



MINER'S CAP LAMP.  
No. 32.

The names of the various parts indicated by numbers above are given below:

- |                         |                        |
|-------------------------|------------------------|
| 1. Water tank.          | 7. Burner.             |
| 2. Raking Wire.         | 8. Small Felt.         |
| 3. Cover of Water-Tank. | 9. Large Felt.         |
| 4. Water-tube.          | 10. Wire Gauze.        |
| 5. Burner-tube.         | 11. Hook.              |
| 6. Reflector.           | 12. Rubber Gasket.     |
|                         | 13. Carbide Container. |

**Baldwin Superintendent's Lamp**

Burns 6 hours with one charge.  
Weight, 10 ozs.; height, 6½ inches.  
Made of galvanized iron.

This lamp will throw a strong light over 50 feet.  
Makes overhead examinations easy.  
One extra carbide container with each lamp.

Price .....\$2.00  
Extra Carbide Containers 35c. each.



SUPERINTENDENT'S LAMP.  
No. 36.

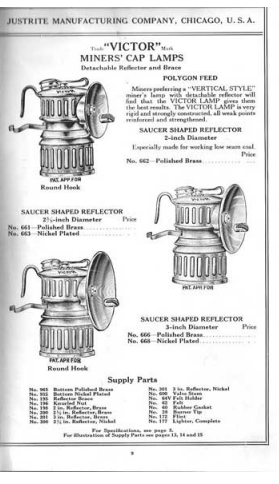
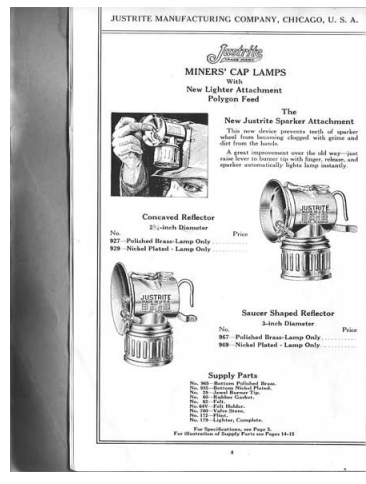
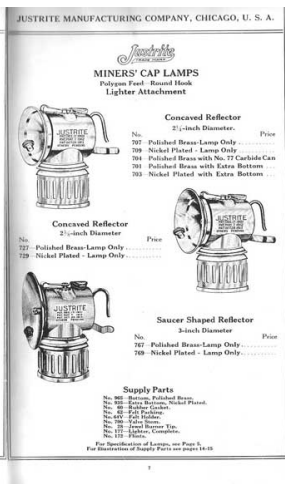
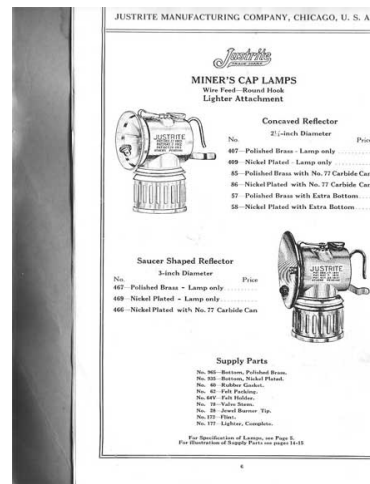
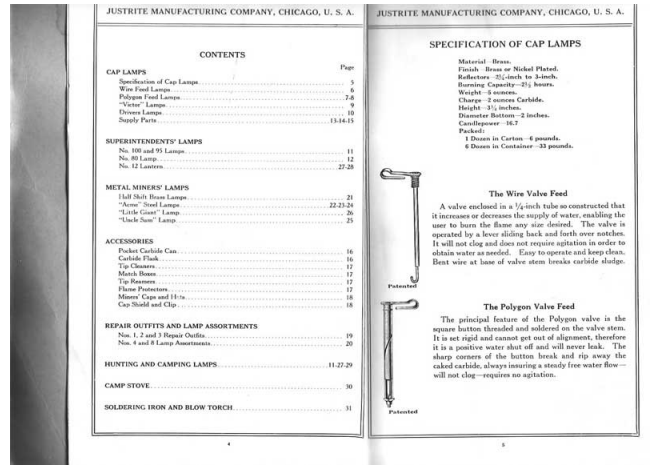
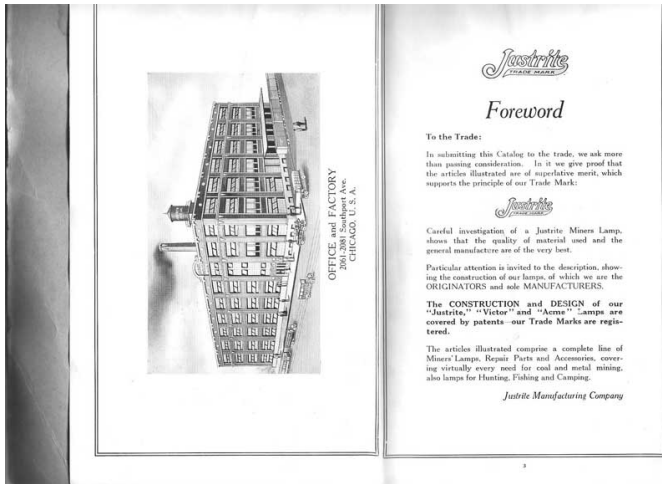
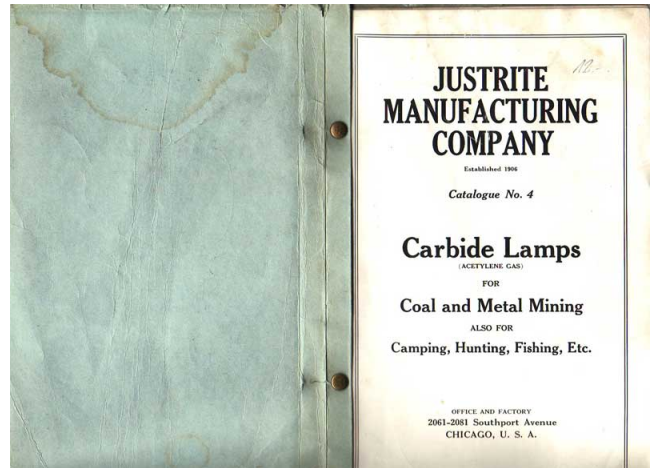
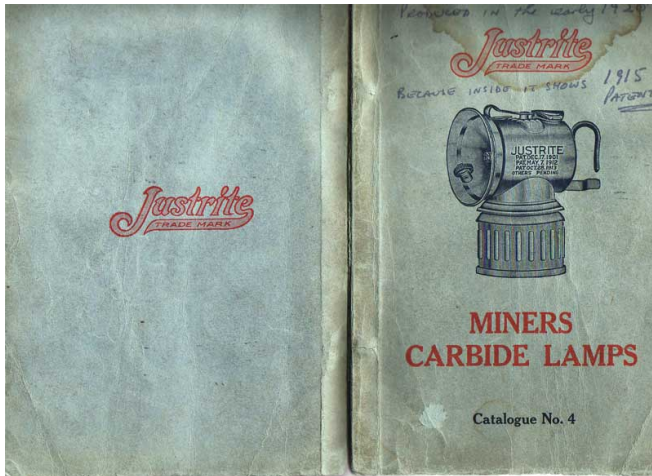
*American Mining Tool Company catalog shows Baldwin lamps that date to 1900–12. Oil wick lamps exist with this company's name, but to date, there is not a private label carbide lamp.*



# Justrite Catalogue No. 4

by Dave Thorpe

Found in Wilnsdorf, Germany June, 2007






JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**SPECIAL DRIVERS LAMP**  
Round Hook  
Nickel Silver Reflector  
2 1/2 inches in Diameter

**Polygon Feed**  
This lamp has extra deep concave nickel silver reflector—exterior finish polished brass. Equipped with No. 179 Flame Protector, making lamp wind and water proof.

The lamp is especially designed for use in those subject to strong air currents. DRIVERS, MOTORMEN, ENGINEERS, TIMBERMEN and SHOT-FIRERS will find this lamp very satisfactory.



No. 179 Flame Protector

No. 787 Lamp only

**Supply Parts**

- No. 80—Rubber Gaskets
- No. 81—Rubber Gaskets
- No. 82—Rubber Gaskets
- No. 83—Rubber Gaskets
- No. 84—Rubber Gaskets
- No. 85—Rubber Gaskets
- No. 86—Rubber Gaskets
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- No. 95—Rubber Gaskets
- No. 96—Rubber Gaskets
- No. 97—Rubber Gaskets
- No. 98—Rubber Gaskets
- No. 99—Rubber Gaskets
- No. 100—Rubber Gaskets

If a specification of Lamp, see page 11  
For Description of Supply Parts, see page 11

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**SUPERINTENDENTS' LAMPS**  
Nickel Plated  
Equipped with Lighter Attachment  
Wire Feed



No. 100—With No. 77 Carbide Can  
Brass, Nickel Plated; 2 1/2-inch Reflector; Weight, 6 ounces; Height, 2 1/2 inches.

No. 95—With No. 77 Carbide Can  
Brass, Nickel Plated; 2 1/2-inch Reflector; Weight, 6 ounces; Height, 2 1/2 inches.

No. 80 Flame Protector

The flame protector is removable. Can be used or not as desired. Makes the flame wind and water proof. Flame Protector furnished with above lamps.

**Repair Parts**

- No. 101—Extra Bottom for No. 100
- No. 102—Extra Bottom for No. 95
- No. 103—Extra Bottom for No. 80
- No. 104—Extra Bottom for No. 100
- No. 105—Extra Bottom for No. 95
- No. 106—Extra Bottom for No. 80
- No. 107—Extra Bottom for No. 100
- No. 108—Extra Bottom for No. 95
- No. 109—Extra Bottom for No. 80
- No. 110—Extra Bottom for No. 100
- No. 111—Extra Bottom for No. 95
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- No. 136—Extra Bottom for No. 80
- No. 137—Extra Bottom for No. 100
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- No. 199—Extra Bottom for No. 80
- No. 200—Extra Bottom for No. 100

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

Trade Mark "ACME" Mark  
**SUPERINTENDENTS' LAMP**  
Nickel Plated



No. 80 Lamp

No. 171 Flame Protector

**Specifications**

- Burning Capacity—5 to 6 hours.
- Candle Power—15.
- Weight—1 1/2 ounces.
- Charge 2 ounces Carbide.
- Height of Lamp—5 1/2 inches.
- Diameter Bottom—2 1/2 inches.
- Diameter Reflector—3 inches.

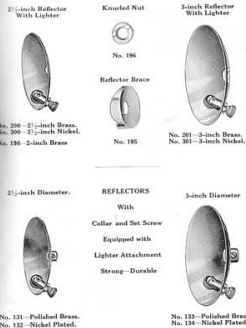
A sturdy and Superintendents' Lamp, highly rated abroad. Equipped with Folding Handle, Lighter Attachment. No. 171 Flame Protector. Polygon Feed.

**Complete List of Repair Parts**

- No. 80—Carbide Container
- No. 81—Carbide Container
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JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**SUPPLY PARTS FOR CAP LAMPS**  
REFLECTORS  
for  
"Victor" Lamps



2 1/2-inch Reflector With Lighter  
No. 196

3-inch Reflector With Lighter  
No. 195

2 1/2-inch Diameter  
No. 194

3-inch Diameter  
No. 193

2 1/2-inch Reflector  
No. 192

3-inch Reflector  
No. 191

2 1/2-inch Reflector  
No. 190

3-inch Reflector  
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2 1/2-inch Reflector  
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3-inch Reflector  
No. 139

2 1/2-inch Reflector  
No. 138

3-inch Reflector  
No. 137

2 1/2-inch Reflector  
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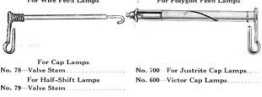
3-inch Reflector  
No. 3

2 1/2-inch Reflector  
No. 2

3-inch Reflector  
No. 1

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**SUPPLY PARTS FOR CAP LAMPS**  
Valve Stems



For Wire Feed Lamps  
No. 78—Valve Stem  
No. 79—Valve Stem

For Polygon Feed Lamps  
No. 100—For Justrite Cap Lamps  
No. 101—Victor Cap Lamps

**Extra Bottoms**

**Description**  
New Justrite Reinforced Bottoms. The same or less of bottom top four layers of metal rolled together. Solder is then forced into the crevices from the inside forming a solid rim 1 inch thick. This rim, and, pulling the same over the rim with metal, a rim 1/2 inch down from outside base. The strength and extra depth outside base bottom make. Add strength just where it is needed.

**The Strongest Lamp Bottoms Made**

No. 80—Polished Brass  
No. 81—Nickel Plated

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**SUPPLY PARTS FOR CAP LAMPS**



For Wire Feed Lamps  
No. 80—Rubber Gasket  
No. 81—Rubber Gasket  
No. 82—Rubber Gasket  
No. 83—Rubber Gasket  
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No. 198—Rubber Gasket  
No. 199—Rubber Gasket  
No. 200—Rubber Gasket

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ACCESSORIES**  
for  
Carbide Lamps



**Carbide Containers**  
Pocket Carbide Can  
No. 77—Capacity, 10 ounces Carbide

Made of light steel, its coated, ribbed, double sealed and double cover, its built-in, in the top of top, holds full supply. Strong and durable. The most convenient and safest carbide supply can on the market. Will not rust.

**Carbide Flask**  
Large Opening  
Eraspart, Freely  
No. 23—With Screw Cap  
No. 24—With Hinged Top

Made of Heavy Tin Double Sealed Strong, Durable

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ACCESSORIES Continued**  
Justrite Wire Tip Cleaners



**Waterproof Match Box**  
No. 73  
Round, Sealed Brass, Nickel Plated. Size 2 1/2 x 1 1/2

**Gas and Fuse Lighter**  
No. 103  
For use on all Justrite Wire and Polygon Wire Cap Lamps also Lamps No. 80 and No. 100.

**Windproof Flame Protector**  
No. 170 Flame Protector  
For use on all Justrite Wire and Polygon Wire Cap Lamps also Lamps No. 80 and No. 100.

**Tip Removers**  
No. 110—Removers, 1 Box in Metal Tube—150—Removers, 1 Box in Paper—150—Empty Remover Cases

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ACCESSORIES—Continued**



No. 232

Black oil cloth, wide rim, with cotton lining and ear flaps. Metal and brass shield. For round back lamps.



No. 234—Brown Canvas  
No. 235—White Canvas

A block mounted steel for holding Cap Lamps in right position. Can be easily attached to miner's cap or hat.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**JUSTRITE REPAIR OUTFITS**  
For  
Miners' Carbide Lamps



Heavy Cardboard Box. Covered with Waterproof Paper. Reinforced Corners. Strong and Durable.

**Contents No. 2 Repair Outfit**

- 1 Doz. No. 60 Carbides
- 3 Doz. No. 82 Fallers
- 1 Doz. No. 83 Fallers
- 2 Doz. No. 84 Fallers
- 2 Doz. No. 85 Fallers
- 2 Doz. No. 86 Fallers
- 2 Doz. No. 87 Fallers
- 2 Doz. No. 88 Fallers
- 2 Doz. No. 89 Fallers
- 2 Doz. No. 90 Fallers
- 2 Doz. No. 91 Fallers
- 2 Doz. No. 92 Fallers
- 2 Doz. No. 93 Fallers
- 2 Doz. No. 94 Fallers
- 2 Doz. No. 95 Fallers
- 2 Doz. No. 96 Fallers
- 2 Doz. No. 97 Fallers
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JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**“ACME”<sup>SM</sup> STEEL CARBIDE LAMP**  
Rust-Proof - Heavily Tinned  
Half-Shift Size

A strong and sturdy steel lamp, built to give service. Constructed with the dependable and regulator TOLVON Water Proof and a REFLECTOR that cannot easily be bent or broken.

Equipped with the No. 29 Jewel Burner Tip and FLAME PROTECTOR. The use of this protector makes the flame drip-proof as well as wind-proof and is particularly useful in wet mines.



No. 50 - With Ball and Hook..... Price

Specifications on page 23. Supply Parts on page 24

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**“ACME”<sup>SM</sup> STEEL CARBIDE LAMP**  
Rust-Proof - Heavily Tinned  
Half-Shift Size

Specifications of  
Acme Steel Lamp Nos. 50 and 56

Burning Capacity - 4 to 6 hours.  
Carbide Power - 10  
Weight - 15 1/2 ounces.  
Charge - 3 ounces Carbide.

Height of Lamp - 5 1/2 inches.  
Height to Top of Ball - 7 1/2 inches.  
Diameter Bottom - 2 1/2 inches.  
Diameter Top - 3 inches.



No. 54 - With Folding Handles..... Price

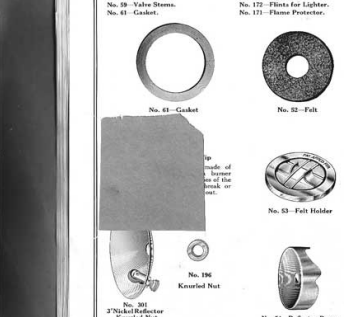
Supply Parts on page 24

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

Supply Parts  
for  
“ACME”<sup>SM</sup> STEEL CARBIDE LAMP

No. 51 - Carbide Container.  
No. 52 - Fuel Holder.  
No. 53 - Reflector Braces.  
No. 54 - Reflector Braces.  
No. 55 - Valve Stem.  
No. 56 - Valve Stem.  
No. 57 - Gasket.

No. 118 - Knurled Nut.  
No. 201 - Nickel Reflector.  
No. 161 - Ball and Hook.  
No. 128 - Jewel Burner Tip.  
No. 171 - Lighter complete.  
No. 172 - Flints for Lighter.  
No. 173 - Flame Protector.




No. 51 - Gasket  
No. 52 - Fuel  
No. 53 - Fuel Holder  
No. 54 - Reflector Braces  
No. 196 - Knurled Nut  
No. 201 - Nickel Reflector (included)  
No. 54 - Reflector Braces

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ALUMINUM MINERS' LAMPS**

The "Uncle Sam"  
Seamless Aluminum  
Removable Spiral Valve Stem

Description  
Strong and substantial in steel and brass and knock, yet light - the shell is 1/2 inch cast aluminum. Steel Ball, Hook and Tangle Lock. Simple, nothing to get out of order. Has the new spiral valve stem water proof that feeds the water evenly and steadily, unaffected by slaking or jarring, and runs up every bit of the scale. No. 224 Unbreakable Attachment for wet mines.



Capacity	No. 205 8 Hours	No. 208 8 Hours
Height of Lamp	2 1/2 Inches	6 Inches
Diameter Bottom	3 1/2 Inches	3 1/2 Inches
Diameter Top	4 Inches	3 1/2 Inches
Carbide Power	14	20
Weight	1 1/2 Inches	3 Inches
Carbide Charge	8 Ounces	8 Ounces

No. 208 - With Reflector, 6 Hour Capacity..... Price  
No. 205 - With Reflector, 8 Hour Capacity..... Price

Repair Parts for "Uncle Sam" Lamps

No. 104 - Gasket for No. 204 Lamp.  
No. 105 - Gasket for No. 205 Lamp.  
No. 106 - Screen for No. 204 Lamp.  
No. 107 - Screen for No. 205 Lamp.  
No. 108 - Tip and Burner for All Lamps.  
No. 109 - Carbide Container for No. 204 Lamp.  
No. 110 - Carbide Container for No. 205 Lamp.

No. 202 - Valve Stem for No. 204 Lamp.  
No. 203 - Valve Stem for No. 205 Lamp.  
No. 204 - Reflector for No. 204 Lamp.  
No. 206 - Locking Charge for No. 204 Lamp.  
No. 207 - Locking Charge for No. 205 Lamp.  
No. 208 - Water Cup and Spring for All Lamps.  
No. 209 - Carbide Container for No. 204 Lamp.  
No. 210 - Carbide Container for No. 205 Lamp.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ALUMINUM MINERS' LAMPS**

The "Little Giant"  
Removable Spiral Valve Stem

Made of 1/2-inch Seamless Aluminum in one size only - 6-hour capacity. Reflector in part of the lamp cannot be broken off. Equipped with steel ball and hook and has large screw threads for fastening the top and bottom together. It is wonderfully simple, sturdy, constructed and easy to operate. Has only a few extra parts. Low maintenance cost.



No. 110 - 6 Hour Capacity..... Price

Specifications  
Height of Lamp - 5 1/2 inches.  
Diameter Reflector - 3 1/2 inches.  
Weight - 31 ounces.  
Charge - 3 ounces.  
Carbide Power - 18.

Repair Parts

No. 114 - Rubber Gasket.  
No. 115 - Filter Screen.  
No. 116 - Filter Screen.  
No. 117 - Filter Screen.  
No. 118 - Valve Stem.  
No. 119 - Tip and Burner.  
No. 120 - Ball and Hook.  
No. 121 - Valve Stem.  
No. 122 - Rubber Gasket.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**THE "JUSTRITE" ACETYLENE LANTERN**

Automatic Generation

The Favorite Camp Light

Light in Weight

Excellent for All Outdoor Uses



No. 12

Has a 20 candle power light. Burns 3 to 4 hours with 3 ounces of carbide. Flame controlled by the valve can be turned high or low or extinguished as desired. Light of lamp dismounts, raised, placed and easily polished. No complicated parts to get out of order and very easy to operate.

Equipped with self-light attachment. No matches needed.

The most successful automatic generating acetylene lantern.

For Hunters, Sportsmen, Campers, Mine Superintendents, Inspectors, Mining Engineers, Watchmen, Timbers and for the Automobile.

Superior to any portable light in cleanliness, safety and candle-power.

No. 12 - Lantern.


Equipped with Bull's Eye Lens and Reflector.

Repair Parts

No. 123 - Bull's Eye Lens.  
No. 124 - Valve and Tip.  
No. 125 - Valve Stem.  
No. 126 - Water Container.  
No. 127 - Carbide Container (2 Shell).  
No. 128 - Reflector.  
No. 129 - Bull's Eye Lens.  
No. 130 - Valve and Tip.  
No. 131 - Valve Stem.  
No. 132 - Water Container.  
No. 133 - Carbide Container (2 Shell).  
No. 134 - Reflector.  
No. 135 - Bull's Eye Lens.  
No. 136 - Valve and Tip.  
No. 137 - Valve Stem.  
No. 138 - Water Container.  
No. 139 - Carbide Container (2 Shell).  
No. 140 - Reflector.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

REPAIR PARTS FOR NO. 12 LANTERN



Lava Burner Tip No. 124.7  
Rubber Gasket No. 124.1  
Glass No. 124.9  
Bottom-Water Shell No. 124.6  
Dome No. 124.3  
Bull's Eye Lens No. 124.11  
Lighter Complete No. 124.2  
Valve Stem No. 124.3  
Valve and Tip No. 124.4  
Outside Shell Carbide Container No. 124.5 (2 Shells)

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**THE "JUSTRITE" HUNTER'S HEADLIGHT**

For Hunters, Trappers, Fishermen, Farmers. Also ideal for traveling over mountain trails at night.

Throws light distance of 200 feet directly in front of you; just where it is needed. Both hands free for whatever you are doing.



No. 44..... Price

Cap and included with outfit. Color separately. Special cap No. 214 cap and No. 231 cap.


Special Concentrating Lens

Repair Parts

No. 45 - Carbide Container.  
No. 46 - Water Tank.  
No. 47 - Filter Screen.  
No. 48 - Head Lamp.  
No. 49 - Valve Stem.  
No. 50 - Glass Lens.  
No. 51 - Glass Lens.  
No. 52 - Glass Lens.  
No. 53 - Glass Lens.  
No. 54 - Glass Lens.  
No. 55 - Glass Lens.  
No. 56 - Glass Lens.  
No. 57 - Glass Lens.  
No. 58 - Glass Lens.  
No. 59 - Glass Lens.  
No. 60 - Glass Lens.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ACETYLENE CAMP STOVE**  
No. 11



No. 11 - Stove

One of the most compact camp stoves - just the thing for the auto tourist, picnicer, camper, hunter and sportsman. Also excellent for the motor boat and yachting trip.

Acetylene gas produces the most intense heat. 10 ounces carbide yields enough gas to cook a meal. Constructed very strong - simple and economical to operate.

Repair in Campstoves - can be packed under auto seat or with the camping outfit without danger of spoiling food or clothing. Stove complete in metal metal container 19 inches long, 5 inches diameter. Shipping weight, 6 pounds.

REPAIR PARTS

No. 101 - Valve, Complete.  
No. 102 - Burner Tip.  
No. 103 - Burner Tip.  
No. 104 - Burner Tip.  
No. 105 - Burner Tip.  
No. 106 - Burner Tip.  
No. 107 - Burner Tip.  
No. 108 - Burner Tip.  
No. 109 - Burner Tip.  
No. 110 - Burner Tip.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**JUSTRITE HUNTER'S HEADLIGHTS**  
For Hunters, Trappers, Fishermen, Farmers. Also ideal for traveling over mountain trails at night.



No. 26 - Lamp (2 in. included)  
No. 27 - Lamp (2 in. included)  
No. 28 - Lamp (2 in. included)

Under Cap Separately - Specialty Size  
No. 29 - Burner Tip.  
No. 30 - Burner Tip.  
No. 31 - Burner Tip.  
No. 32 - Burner Tip.  
No. 33 - Burner Tip.  
No. 34 - Burner Tip.  
No. 35 - Burner Tip.  
No. 36 - Burner Tip.  
No. 37 - Burner Tip.  
No. 38 - Burner Tip.

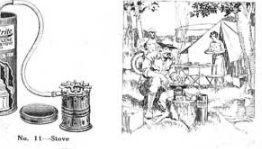
Special Concentrating Lens for No. 44A Lamp only

REPAIR PARTS

No. 44A - Burner Tip.  
No. 44B - Burner Tip.  
No. 44C - Burner Tip.  
No. 44D - Burner Tip.  
No. 44E - Burner Tip.  
No. 44F - Burner Tip.  
No. 44G - Burner Tip.  
No. 44H - Burner Tip.  
No. 44I - Burner Tip.  
No. 44J - Burner Tip.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**ACETYLENE CAMP STOVE**  
No. 11



No. 11 - Stove

One of the most compact camp stoves - just the thing for the auto tourist, picnicer, camper, hunter and sportsman. Also excellent for the motor boat and yachting trip.

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Repair in Campstoves - can be packed under auto seat or with the camping outfit without danger of spoiling food or clothing. Stove complete in metal metal container 19 inches long, 5 inches diameter. Shipping weight, 6 pounds.

REPAIR PARTS

No. 101 - Valve, Complete.  
No. 102 - Burner Tip.  
No. 103 - Burner Tip.  
No. 104 - Burner Tip.  
No. 105 - Burner Tip.  
No. 106 - Burner Tip.  
No. 107 - Burner Tip.  
No. 108 - Burner Tip.  
No. 109 - Burner Tip.  
No. 110 - Burner Tip.

JUSTRITE MANUFACTURING COMPANY, CHICAGO, U. S. A.

**SOLDERING IRON and BLOW TORCH**  
No. 19



The Handy Tool For Anyone

This new chemical gas, pressure and pressure system, or explosive electric system are required to do the small job. Just charge with denatured alcohol and in a few minutes you are ready for use.

An indispensable tool for Carpenters, Tin-Smiths, Plumbers, Electricians and mechanics in general.

Automatic gasometer and burner system will find it the handiest tool in their kit. It is an indispensable tool for the boy. He can solder to his heart's content.

Justrite Soldering Iron packed complete with Special No. 19 Attachment and Reflector.

Weight - 10 ounces each.

Price

Repair Parts

No. 19A - Gasometer.  
No. 19B - Burner Tip.  
No. 19C - Burner Tip.  
No. 19D - Burner Tip.  
No. 19E - Burner Tip.  
No. 19F - Burner Tip.  
No. 19G - Burner Tip.  
No. 19H - Burner Tip.  
No. 19I - Burner Tip.  
No. 19J - Burner Tip.

# Terre Haute's Boom Town Lamp

*by Dave Thorpe*

The Wabash and Erie Canal reached Terre Haute, Indiana in 1849, and railroad operations began in 1852. Following the Civil War the city became a major industrial and mining center with steel mills, coal mines, and breweries. During this time it also became known for its gambling and brothels – a wild-west town in eastern U.S.

Luck and superstition have always figured prominently in the culture of gamblers and miners. And so from this milieu, a miner's oil wick lamp was made in Terre Haute bearing the stampmark of a horseshoe, America's most recognized symbol of good luck.



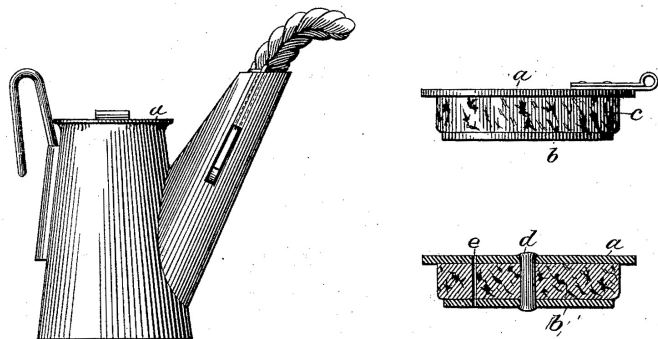
*The "Miners Choice" oil wick lamp is deeply stamped with a horseshoe and has two patent dates of*

John Deeds held two patents whose dates are stamped into this lamp. The Deeds patent of July 24, 1883 describes a lid made of a cork wafer sandwiched between two metal discs so as to make a tight seal. The lamp shown here has an all-metal door but it is not perforated like most lids. It fits snugly into a font whose inlet is double-reinforced. The July 30, 1883 patent was for a wick raising device.

J. B. DEEDS & W. MACK.  
LID FOR MINERS' LAMPS.

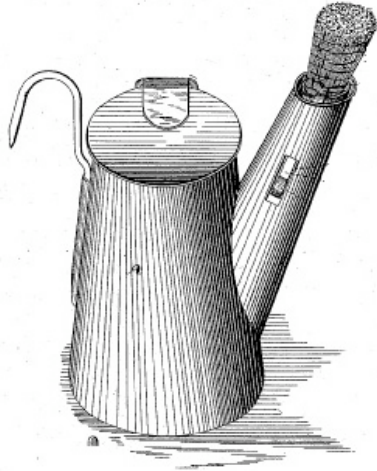
No. 281,846.

Patented July 24, 1883.





J. B. DEEDS.  
WICK RAISER FOR LAMPS.  
No. 282,282. Patented July 31, 1883.



Neither patent materialized on example shown above. The practice of stamping in patent dates that did not belong to a lamp was occasionally used in the mine lamp industry. Perhaps its value was in giving the appearance of propriety.

A Miner's Choice lamp has been found with the patented wick raiser (Jack Schultz collection), and small details vary from lamp to lamp. A Miner's Choice lamp owned by Bob Guthrie does not have a reinforced bottom seam.

*July 31, 1883 patent for a wick raising mechanism.*



*Left: Patented wick raiser is present on this lamp owned by Jack Schultz.*



*Right: Note lack of reinforced bottom seam on this lamp owned by Bob Guthrie.*

Prohibition (1920-1933) dealt a serious blow to the economy of Terre Haute, closing many breweries and distilleries as well as several glass making companies and entertainment venues. The sin-city that was on its way to becoming another Las Vegas sank into oblivion. Today it is best known for its "correction center" that is the official federal death row. There are surely a few souls in Terre Haute whose last hopes lie in prayers, four-leafed clovers, and horseshoes.

# Patent Models, Copies — or Fakes?

*by Al Winters*

Patented miners candlesticks are very collectible and it is almost beyond belief that inventors could apply for and receive approximately 88 patents for a simple metal device used to hold a candle. The Washburn, patented in 1872, was the first candlestick to receive a patent and the Huuskanen, received the last patent in 1917. Patented miners candlesticks seldom have a stamping and often do not exactly resemble the patent drawing.

When a candlestick is marked and resembles the patent drawing you can be sure of its authenticity. When it resembles the patent you can be fairly sure of its authenticity. The unmarked Powell candlestick (patented June 1899 in Lead, SD) for example, follows the patent drawing exactly but is made of round rather than square stock. It was found in the immediate area where the inventor lived which gives it some authenticity. The Peacock (patented Aug. 1900 in Altman, CO) is not marked and only partially resembles the patent drawing. Three examples are known to have come from the Cripple Creek area which gives them authenticity. One of the examples however, is constructed differently than the other two. Does it perhaps represent a “Patent Model, Copy or Fake” or maybe just an example of an early prototype undergoing a design change? The minor design change of two identical sticks would significantly reduce the manufacturing cost?

A blacksmith would come up with what he thought was a new and better idea for a different locking mechanism, fuse cutter addition, flame snuffer, or what have you and build a model incorporating his new idea. If the finished product looked promising, he would possibly apply for a patent and take the prototype to a manufacturer to get a quote for machine production. If there were flaws in the original design an improved model was often pounded out and perhaps resubmitted. Three different examples of the Werntz candlestick (patented Dec. 1888 in Placerville, CA) are known and are assumed to represent the inventors attempt to improve his design. On the other hand do the two which do not exactly follow the patent drawing represent a “Patent Model, Copy or Fake”?

At the manufacturing plant, the blacksmith prototype may again require modification to improve the design, reduce costs or to facilitate machine production requirements. Whatever the reason, major changes in design were sometimes experienced. The Bernier candlestick (patented Aug. 1899 in Victor, CO) is a good example of what I believe is a manufacturing change. The actual hook and thimble arrangement of the production stick compared to the patent drawing is certainly a good example of a design change to reduce cost of machine manufacturing.

The following candlesticks compare the patented stick and what may be a “Patent Model, Copy or Fake”. In most cases the “Patent Model, Copy or Fake” is built much stronger and more mine resistant than the patented production example.

The first example is the Fielding & Peterson which was patented in Grants Pass, OR in 1903. The patented stick was produced from machine stampings with a very unique locking device and is certainly one of the more practical folders. The "Patent Model, Copy or Fake" is essentially the same size but is handmade with a perfection that can only be obtained by a gunsmith or similar craftsman. The precision of the locking device and fitting of the parts is marvelous to behold.



*Patent model or copy?*

When you hold this stick you have to ask yourself why would anyone go to the trouble to Copy or make a Fake of the Fielding & Peterson? It is simply too difficult a task to complete such a Copy or Fake as illustrated even with modern machinery and materials.



*Above: genuine Fielding & Peterson. Below: a slightly different stick, a model or copy.*

The next example is that of the Jones patent which was patented in Oregon City, OR in 1883. The rare patented sticks are both marked and unmarked. The example shown is owned by Chuck Tesch and is unmarked. It is 6 inches long, delicate and would last in a mining environment but a few shifts. The "Patent Model, Copy or Fake" is 9 ½ inches long and blacksmith made. The construction is crude, very substantial and could be expected to last in a mine setting. One has to ask however; Why would anyone make a Copy or Fake of a stick with a design that simply wouldn't work? The candlestick came from Northern California via a grandson from Butte, MT.



*Above: Jones patent stick.*



*Above: Jones-like stick.*



The next example is the “Eureka” or Pateneau stick (patented in Helena, MT in 1883). The patented stick is both marked and follows the patent drawing exactly. When unfolded the reciprocating folder is 7 ½ inches long. The weak characteristic of the stick design is the flimsy hook. The spike is secured by means of a tapered lug which fits into a tapered slot in the handle. The hook depends solely on the spring in the handle steel to hold it in the upright or folded position. The “Patent Model, Copy or Fake” is larger, built the same and the locking device is secured by an additional tightening nut. It is of very good construction and presently believed to be in the collection of Mike Bergman. In the past, this stick was the subject of discussion concerning a Copy or Fake, but in my opinion is authentic and represents either a Patent Model (it is cheaper to manufacture without a tightening nut) or an after market improvement by the inventor to try and make the stick more mine worthy.



*Above: genuine Eureka stick.*



*Not quite a Eureka — patent model or copy?*

In the examples shown the sticks similar to the patents, in my opinion, were old based on experience. Other examples of candlesticks similar in design to patented sticks exist, but you can never be 100% sure, so it is up to the collector to determine the authenticity. Is it a patent model, copy or a fake? You be the judge!

# Cast Aluminum Oil-wick Cap Lamps

*by Dave Johnson*

Most miners' oil-wick cap lamps were manufactured of thin sheet steel and many were tin-plated to protect the steel from rusting. This tin-plating has resulted in many people erroneously referring to them as "tin" lamps rather than tin-plated. After steel, the next most common material used was sheet brass, followed by sheet copper. There were also several combinations of materials — steel and brass, steel and copper, brass and copper, steel, copper and brass.

The material used least often by oil-wick lamp manufacturers was cast aluminum, which required an entirely different manufacturing process than the sheet metal lamps. Shown here are seven different models of cast aluminum oil-wick cap lamps. Two of them are much more common than the other five, these are the two marked PAT. APD. FOR.



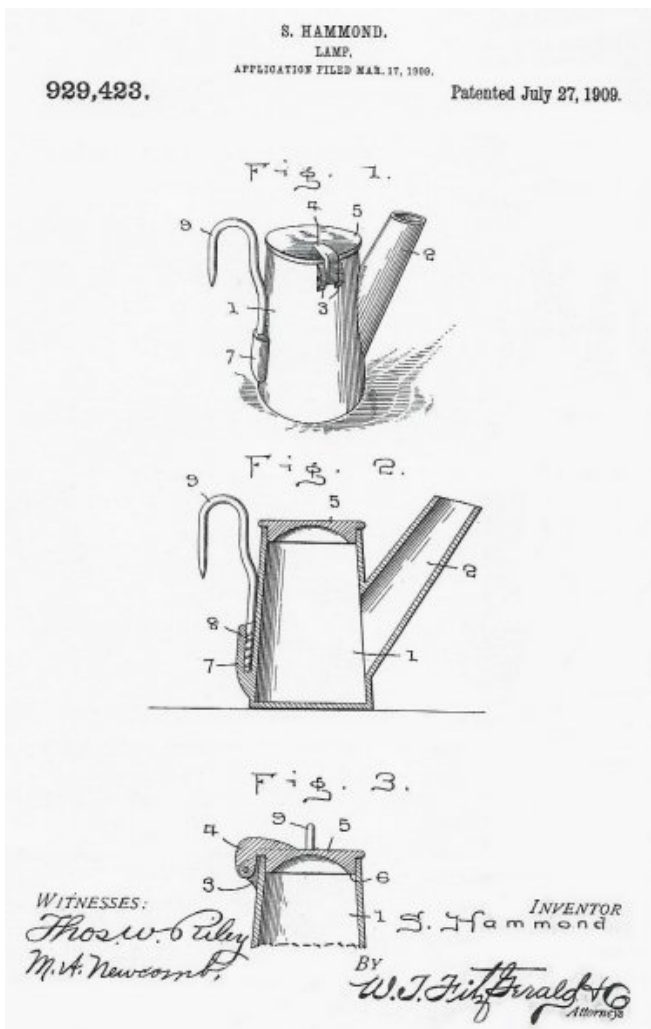
*Above: PAT. APD. FOR lamp.*



*Above: A second variety PAT. APD. FOR*



The only cast aluminum oil-wick cap lamp with a name appearing on it is the rare NO MELT lamp with the raised cast name appearing vertically on the side of the font shown here. This lamp also has the patent date of JULY 27, 1909 cast into the lid. This patent date corresponds to patent number 929,423 issued to Scott Hammond of Freeport, Stephenson County, Illinois. This lamp measures 2 1/8" to the top of the lid.



Hammond's patent addresses a lamp with a "one piece cast body and spout". The patent also addresses "a pair of ears cast integral with the body and adjacent the upper end thereof between which is pivotally secured a tongue, which tongue is integral with a cover, said cover having a flange which is adapted to extend into the upper end of the body and form a perfect closure." The patent further states that "the outer face of the body is also provided with an integrally cast socket which is cast around the threaded end of a suspension hook thereby making the hook a fixture with the body and holding the same against removal from the socket." The patent finally states "By constructing the lamp in this manner and casting the various parts thereof, it will be readily seen that the lamp will be indestructible and will have no joint of points of leakage and it will be further seen that the lamp may be cheaply constructed and comparatively light and will not become battered and broken as is the case with lamps constructed of tin and similar metal."



*Above: Small cast aluminum lamp identical to the NO MELT but without stamping.*



*Above: Cast lamp with match striking surface and drip ring on spout.*

One of the PAT APD FOR lamps mentioned earlier is a slightly larger model cap lamp with small letters and the other is a slightly smaller lamp with larger letters. The larger lamp measures 2 5/8" to the top of the lid and the smaller lamp measures 2 1/4" to the top of the lid. The smaller lamp has the spout sitting higher on the side of the font than the slightly larger model. The lid of the larger lamp has a small cast tab to facilitate opening the lid, while the smaller lamp does not have this feature. The lid hinges on the two lamps are identical. These hinges differ from Hammond's patent in that on the No Melt lamp the two cast "ears" are integral to the lamp font, while on the PAT APD FOR lamps the "ears" are integral to the lid. On both the NO MELT and the PAT APD FOR lamps the lid is attached with a steel pin. As many collectors know, steel and aluminum are not a good combination. With age, the steel pin reacts with the aluminum and the hinge no longer swings freely. In an effort to open the old lamps force is used and the weaker cast ears tend to snap off rather than the steel pin breaking.

An unmarked lamp with the same hinge style as the PAT APD FOR is the unique lamp pictured here with a cast match striker on the side of the font. Also cast-in is a ring near the end of the spout and a raised spiral that runs around the spout. This lamp measures 2 3/8" tall to the top of the lid.



The last two cast lamps are of different but similar designs, they both have flat backs. The flat back allowed the lamp to side flat against the lamp bracket and not tip side to side as the round back lamps with wire hooks would do. The first of these is the very rare INDESTRUCTIBLE oil-wick lamp made by the American Safety Lamp and Mine Supply Co., manufacturers of many models of safety lamp and the Scranto carbide cap lamp. This lamp appeared in ASL&MSCo. advertisements but does not carry their name. This example measures 2 13/16" tall to the top of the lid. This lamp has the "ears" integral to the lid and the lid is held in place by a brass pin, a much better design than the steel pinned lids found on the other cast oil-wicks.



*Above and left: The flat backed "Indestructible."*



The last cast oil-wick lamp is a real anomaly, it is another flat back lamp but the manufacturer never completed it. There is no lid, no hinge, and the opening to the font was never machined to accept a lid. The steel hook

is very thin wire, much thinner than any other full-size oil-wick cap lamp I have ever seen. The base of the font flares out to give the lamp more stability when sitting.



I am aware of another cast aluminum oil-wick with a squared spout, making it very unusual. Cast aluminum oil-wicks are just another of the myriad differences found in oil-wick cap lamps. There seems to be no end to the differences that can be found among oil-wick cap lamps.

*Left: an unfinished flat backed lamp.*

# Funke's Indestructible Lamp

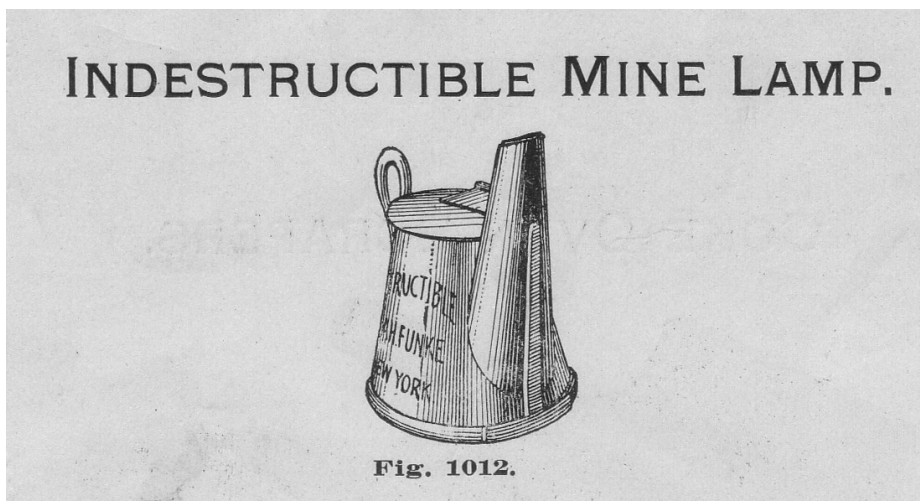
*by Dave Thorpe*

The Indestructible name is most often associated with a cast aluminum oil-wick lamp that was made by the American Safety Lamp and Mine Supply Co. of Scranton, PA. These lamps were rugged though only a few exist in today's collections. They have neither the Indestructible name nor the company name stamped into the lamp, rather they are known as "Indestructible" from advertisements.



*Above: Indestructible lamp by ASL&MCo. D. Johnson collection.*

Yet there was another Indestructible lamp made of sheet metal that was manufactured by A. H. Funke of New York. The image below is from a 1902 Miller Supply Catalog of Huntington, WV. The lamp shown is stamped with both the Indestructible name as well as the maker. The text tells us that the lamp was made sturdy by adding a reinforcing bar along the spout. The lamp is rarely found today. I am aware of only one example in a collection. Perhaps Funke made very few Indestructible lamps – and those that sold may not have survived as well as advertised.



*Left: Funke's Indestructible lamp.*

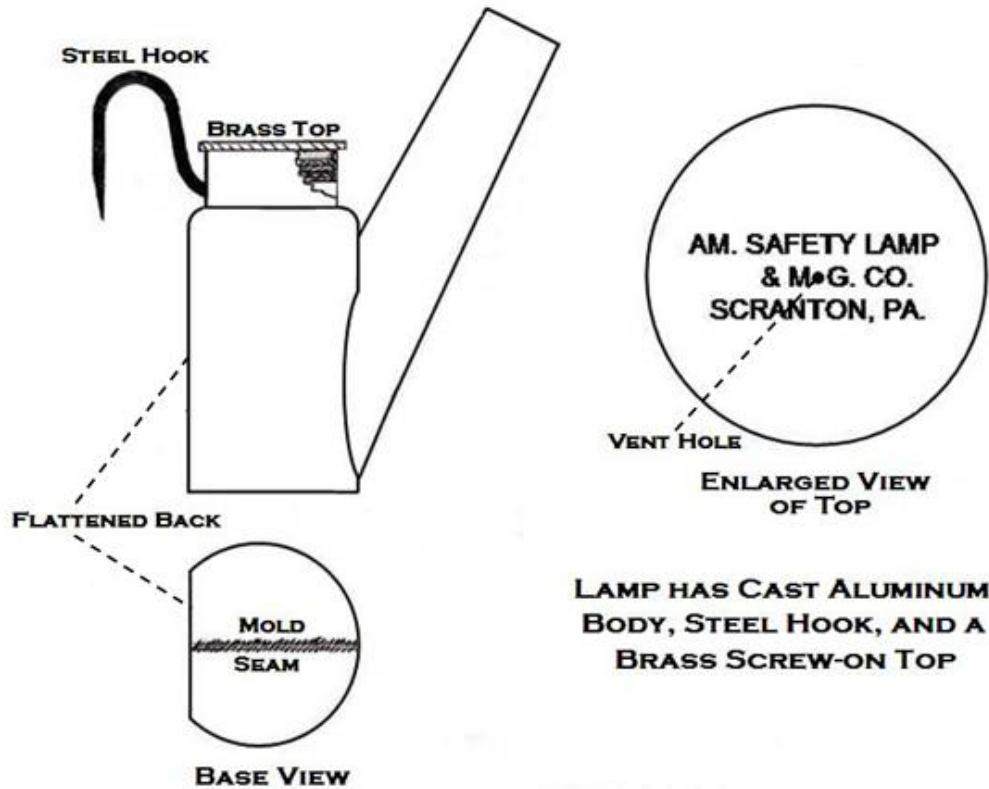
Is reinforced with a steel shoe along the spout, and around the bottom, to receive the oft repeated blows given by the miner, when knocking up the wick.

This constant knocking causes the ordinary lamp soon to leak around the spout, and become useless. Our steel shoe receives all this shock without damage, causing the lamp to last indefinitely. Made with either hinged cover or screw top.



# The Indestructible Lamp: Early Models

by John Leahy



Above is an early version of the cast aluminum Indestructible oil-wick lamp. I believe this screw-top model predates the more usual version with a hinged door. The advertisement shown below is from 1898. The screw-top lamp would predate this. It is noteworthy that the stamping on the door of this lamp is American Safety Lamp & Mfg. Co. — different from the more recent American Safety Lamp & Mine Supply Co.

**SAFETY LAMPS, ALL TYPES.**  
 American Manufacture.  
 EVERY LAMP GUARANTEED PERFECT.  
 GLASSES, IRON OR COPPER GAUZES, AND ALL PARTS FOR ANY MAKE OF SAFETY LAMPS.  
 REPAIRING PROMPTLY DONE.

**SEAMLESS ALUMINUM HEAD-LAMPS**  
 CAST IN ONE PIECE. With Either Brass or Steel Hook.  
 No Spout or Hooks to Melt off.

**GREASE CUPS,** Brattice Cloth, Pneumatic Signal Gongs, Cotton Duck, Mine Whistles, General Brass and Aluminum Work.

**AMERICAN SAFETY LAMP & MINE SUPPLY CO., Scranton, Pa.**



SEAMLESS ALUMINUM HEAD-LAMP  
 SEND FOR CATALOGUE



*The photos above show a surviving example of an A. H. Funke Indestructible as described in Dave Thorpe's article. The reinforcement bar is an inverted 'T'.*





# Restoration of Miner's Candlesticks

*by Al Winters*

Several collectors have written articles on their efforts to repair, restore and preserve both oil and carbide lamps. The techniques developed were largely by trial and error and most likely involved many failures and I might add tears before their techniques were successful. Excellent work has been documented and shared by several of our present day collectors and our hats are off and thanks given to these craftsmen. Fewer collectors have probably attempted to repair candlesticks but excellent work has been achieved and noted. Roger Peterson, undoubtedly the most talented of today's craftsmen, has developed the techniques and experience to tackle the most difficult of repairs. Roger published an article in the spring issue of *The Mining Review* in 1997 called *Restoring Mining Artifacts* and discussed several of his projects, the rewards of preservation of these beautiful and rare artifacts and his ideals regarding marking and restoration.

Repair or restoration of artifacts will always be controversial and collectors will have to judge for themselves what their personal thoughts are regarding the subject. I have personally made a few repairs and believe that restoration is of great benefit in certain cases and not in others. I have also purchased a couple of replacement parts such as the wind shield for the Kelly candlestick and spare reflectors for a few carbide lamps used for my personal display purposes. The following three examples of candlestick restoration are illustrated for your review and thoughts. I chose to have these three patented candlesticks restored as the damage was severe and I felt strongly that these patented sticks because of their rarity, should be restored to near their original design or construction. Great effort went into the design, manufacture and patenting of these candlesticks and I felt restoration would honor those efforts. Two of the candlesticks are the only examples known and only a couple

## **Viera Candlestick**

This first candlestick surfaced a few years back and was patented November 1, 1910 by Antonio Viera of Ray, Arizona Territory. The stick has a unique locking system employing a steel spring attached from the handle which forces both the hook and thimble to remain in the upright or folded position. The stick does

not exactly follow the patent design but the locking mechanism is so unique as to verify its authenticity. The stick as found had the handle broken off. As this is the only known example of the Viera patent and one of the few (if not the only) surviving patented examples from Arizona, I asked Roger Peterson if he felt it could be repaired. The challenge proved too much for Roger and he accepted. He later termed the artifact as the "Candlestick From Hell" because of the difficulty in the repair and welding. The metal at the handle break was comprised of two layers of steel brazed together which of course presented all kinds of problems in attaching the new handle. The following pictures illustrate the before and after as well as Roger's talent.





*The Viera stick after repair.*

### **Huuskanen Combined Lamp-Holder and Candlestick**

This second example was Patented December 4, 1917 by William Huuskanen of Butte, Montana. This was the last patented candlestick and incorporated a lamp holder as well. I purchased the candlestick years ago. It was painted gold and eventually the candle holder and hook broke at the sharp bend of the metal strap following the lamp ring. I simply bent the strap outward and showed the holder as a lamp stick for several years. Later, after obtaining a copy of Wilson's patent book, I realized what the artifact actually was and contacted Peterson who just happened to have the other known example. Again I called on Roger to make the repairs and an excellent job was completed. To my knowledge only two exact examples of the patent are known with a third variation in existence. As this was a machine stamped product, there likely will exist additional examples. The timing of the patent however, would have limited the numbers as the carbide lighting in the Butte mines had become standard prior to the patent date. One can just imagine an old time Finnish miner who had reluctantly changed to a carbide lamp but still hesitated to trust it enough to go without his candle. The following pictures show the artifact before, after and fully loaded with candle and lamp.



*Huuskanen stick with missing hook and thimble.*



*Huuskanen stick after repair.*

### **Cox Candlestick**

This third example was patented August 17, 1886 by Thomas Cox of Gloster, Montana Territory. The stick was purchased from an e-bay dealer a year ago and was recently the subject of discussion in the Eureka Forum. I decided to try and restore this stick as it is the only known example of the Cox Patent with the patented outside spring and candle lock. The handle was broken and the stick severely rusted. Most people, without knowledge of what the item was, would have thrown it out as a piece of rusted junk. Liquid Wrench and a lot of elbow grease, wire brushing and some sanding took care of most of the rust and I was able to weld on a new handle after cutting the broken ends off square. The following pictures show the artifact before and after the restoration.



Again, restoration is up to the collector and repairs should always be documented. Most importantly, major candlestick restoration should only be attempted by a qualified craftsman who appreciates the significance of the artifact and its historical value.



*Left: Cox stick before and after repair.*



# Joseph Cooke Safety Lamp

*by Jim Van Fleet*

I'm happy to report a lamp find from central Pennsylvania, a fairly unusual one from the home turf of American Safety and Mine Supply and other US lamp manufacturers. When I found this beauty in a local antique shop, all I knew was that it was a Davy style safety lamp, and I guessed it might be from a European maker. The lamp top bears a very faint maker's stamp, possibly a triangle, with the letters C and B visible.



The original owner was proud of this lamp, or very protective, and had his name stamped on it in large bold letters, both on the oil font and the lamp body. 'Edwin W. Davies' was my second clue that this was likely a British or Welsh safety lamp.



In the age of the Internet and instant gratification, it took me only one day and two emails to find out what I wanted to know! Manfred Stutzer, the Eureka! correspondent and resident expert on safety lamps suggested that the maker was Joseph Cooke, Birmingham. David Barrie, author of The Wand of Science reference book and web site (<http://www.thewandofscience.co.uk/>) confirms the maker, and sent me some very helpful text and images from his safety lamp references, including a drawing of the complete logo. The stamped numeral 10 on both the lock and the oil font is also a common Cooke feature.

As David points out, the hinged wind shield "was a Cooke speciality; you could just open it when you needed to do a gas test, closing it when the ventilation current was too strong." Joseph Cooke apparently made safety lamps in Birmingham from 1854 to 1918. Having found out this much so easily, I did some genealogical research and found an Edwin W. Davies born in Mountain Ash, Wales in 1864. He emigrated to the United States in 1884 and lived at 583 Charles Ave., Kingston, PA where he worked as a superintendent at a nearby coal mine. He was described as 5' 6" with a "coal scar" on the ridge of his "roman nose." A passport photo from 1923 is shown below:





The lamp body is brass, including the hook and the locking eye on top. It stands 8 inches tall not counting the hook. The hinged parts of the wind shield are held together with a wire pin, possibly steel. The wick holder and wick “pricker” inside the oil font look like they are steel. The very bottom of the lamp is also steel, and these all show some minor rust. The lock is a simple threaded steel screw. Although the lamp appears to have been polished with Brasso or some similar white paste (which fills in the lettering and makes Edwin’s name stand out), it is still an amazing example of preservation and the durability of brass.





# Baby Wolf Safety Lamp Filler

*by Dave Johnson*

It seems there is no end to the new mining artifacts that keep appearing. Anyone other than a newbie artifact collector is aware of the full-size and baby Wolf safety lamps. Most collectors, if they don't own one, have at least seen the Wolf safety lamp filler, but how many of us have seen a Baby Wolf safety lamp filler. I definitely had not seen or heard of such an item, not until I recently saw one listed on ebay. This was one of those "got to have items" so I checked the piggy bank and put in my bid. Fortunately, no one thought as much of this unusual item as I did and I ended up as the successful bidder.

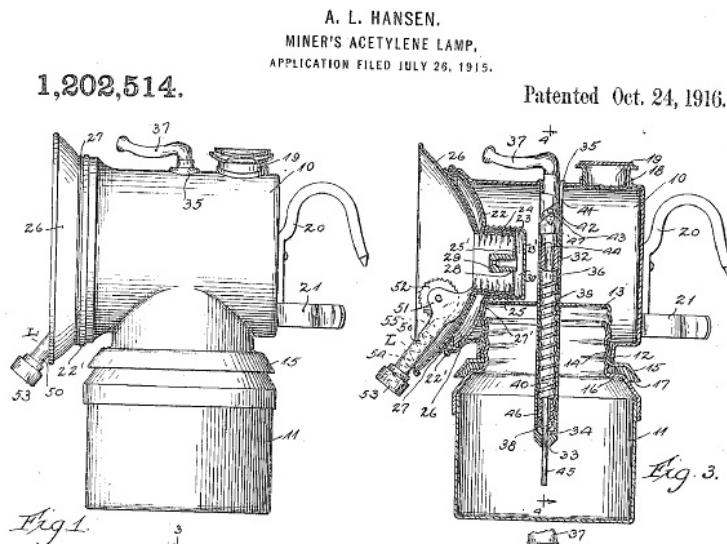
The full-size lamp filler is solid brass, as is the baby filler. Both have threaded filler spouts and a threaded lid at the end of the filler spout, and they are interchangeable between the two fillers. Both have Wolf brass labels. The full-size filler measures 15" tall to the top of the filler spout cap, the baby filler measures 10" tall to the top of the filler spout cap. The full-size filler measures 8 1/8" tall to the base of the sloped shoulder, the baby filler measures 6 1/16" to the base of its much less sloping shoulder. The full-size filler measures 3" in diameter at the base, the baby filler measures 1 3/4" in diameter at the base. Both have the filler caps attached with a chain to keep them from being lost.



# Justrite's Screw-on Reflector

by Dave Thorpe

Justrite's patent designer Augie Hansen frequently combined inventions in his patent drawings. The 1916 patent for the spiral feed lamp includes another interesting feature — a screw-in reflector for a horizontal style cap lamp. Justrite's The Buddy lamp embodied such a reflector, but the lamp itself was vertically oriented and short-lived. Neal Tysver recently found two unfired examples of horizontal Justrites with coined-edge reflectors. These were clearly screw in reflectors, but what lay behind them was far different from the patent drawing.



A thin red gasket was visible between the reflector and the lamp body.

With the reflector removed, a machine threaded stud lay in the socket of the lamp and a short brass tube was attached to the rear of the reflector. The tube was threaded with four holes perforating it to admit gas.





The entire area behind the reflector was a gas chamber. This expansion area was thought to yield a steadier flame. Similar claims had been made for the square-topped Anton lamp which was the subject of a patent dispute with Justrite's The Buddy lamp.

A neatly shaped felt filter sits in the inner recess of the gas chamber. It is trimmed flat on the bottom where it abuts a hole that communicates with the carbide below. There is no need for a felt filter or felt retainer below and neither of these lamps were so equipped.

Only one of the two lamps still retained its disc-shaped red rubber gasket. The drawings below show how I was able to fashion a replacement gasket. I believe these two lamps were prototypes and would be surprised if another example is ever found.



*Above: complete lamp with new red gasket, 3/32" thickness.*

*Right: One reflector was found with a gasket disc, the other without.*

*Below: Red rubber replacement disc.*

